U.S. DEPARTMENT OF COMMERCE
National Oceanic and Atmospheric Administration
NATIONAL MARINE FISHERIES SERVICE
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JUL 18 2018

RE: Re-initiation of the Midway Atoll seawall repairs programmatic Section 7 consultation to include giant manta ray (*Manta birostris*) and oceanic whitetip shark (*Charcharinus longimanus*) (NMFS #PIR-2016-9989, I-PI-18-1641-AG)

Dear Bob:

On June 26, 2018, the National Marine Fisheries Service (NMFS) received a request from the U.S. Fish and Wildlife Service (USFWS) to re-initiate an informal programmatic Endangered Species Act (ESA; 16 USC § 1531 et seq.) Section 7 consultation for the as-needed repairs of the Henderson Airfield seawall on Midway Atoll within the Papahānamokuākea Marine National Monument.

The USFWS has requested re-initiation of the consultation due to the recent listings of the giant manta ray (*Manta birostris*) and the oceanic whitetip shark (*Carcharhinus longimanus*), which were not considered in the original consultation. The manta ray was listed as threatened (83 FR 2916) on January 22, 2018, and the oceanic whitetip shark was listed as threatened (83 FR 4153) on January 30, 2018. The listing of the giant manta ray became effective on February 22, 2018, and the listing of the oceanic whitetip shark became effective on March 1, 2018.

In the initial request for consultation (Midway Seawall Repairs 2017), the USFWS was seeking concurrence on its determination that the as-needed repairs of the seawall that protects the airstrip for Henderson Airfield, Midway Atoll were not likely to adversely affect Hawaiian monk seals (*Neomonachus schauinslandi*), Central North Pacific green sea turtle Distinct Population Segment (DPS) (*Chelonia mydas*), hawksbill sea turtles (*Eretmochelys imbricata*), North Pacific DPS of loggerhead sea turtles (*Caretta caretta*), olive ridley sea turtles (*Lepidochelys olivacea*), leatherback sea turtles (*Dermochelys coriacea)*, Main Hawaiian Islands false killer whale DPS (*Pseudorca crassidens*), sperm whales (*Physeter macrocephalus*), blue whales (*Balaenoptera musculus*), and North Pacific right whales *(Eubalaena japonica*).

The original request for concurrence covered the as-needed construction of a rock wall revetment to repair sections of the current sheet wall that fronts the airstrip, as well as, the transport and staging of construction materials on Midway Atoll. The NMFS responded with its letter of concurrence on May 17, 2017.

This letter underwent pre-dissemination review using standards for utility, integrity, and objectivity in compliance with applicable guidelines issued under the Data Quality Act (section 515 of the Treasury and General Government Appropriations Act for Fiscal Year 2001, Public Law 106-554). The concurrence letter will be available through NMFS' Public Consultation Tracking System [https://pcts.nmfs.noaa.gov]. A complete record of this consultation is on file at the Pacific Island Regional Office, Honolulu, Hawaii.

Proposed Action

The proposed activity would be the transport of construction materials from Oahu, Hawaii to Midway Atoll for the as-needed repairs of the sheet wall that protects the Henderson Field airstrip.

Action Area

The action area would be the waters between Oahu, Hawaii and Midway Atoll within the Papahānamokuākea Marine National Monument

Species That May Be Affected

The USFWS determined that the ESA-listed threatened species under NMFS' jurisdiction listed in Table are known to occur, or could reasonably be expected to occur, in the action area, and may be affected by the proposed activities. Detailed information about the biology, habitat, and conservation status of the animals listed in Table 1 can be found in their status reviews, recovery plans, federal register notices, and other sources at http://www.nmfs.noaa.gov/pr/species/esa/.

Species	Scientific Name	ESA Status	Listing Date	Federal Register Reference
Giant manta ray	*Manta birostris*	Threatened	1/22/2018	83 FR 2916
Oceanic whitetip shark	*Carcharhinus longimanus*	Threatened	1/30/2018	83 FR 4153

Analysis of Effect

In order to determine that a proposed action is not likely to adversely affect listed species, NMFS must find that the effects of the proposed action are expected to be insignificant, discountable, or beneficial as defined in the joint United States Fish and Wildlife Service (USFWS)-NMFS Endangered Species Consultation Handbook: (1) insignificant effects relate to the size of the impact and should never reach the scale where take occurs[1]; (2) discountable effects are those that are extremely unlikely to occur; and (3) beneficial effects are positive effects without any adverse effects (USFWS & NMFS 1998). This standard, as well as consideration of the probable duration, frequency, and severity of potential interactions, was applied during the analysis of effects of the proposed action on ESA-listed marine species, as is described in detail in the ONMS consultation request.

There have been no changes in the planned action or in the species previously covered under the original consultation (Midway Seawall Repairs 2017), so the analysis performed for that consultation remains

[1] "Take" is defined by the ESA as harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect any threatened or endangered species. NMFS defines "harass" as to "create the likelihood of injury to wildlife by annoying it to such an extent as to significantly disrupt normal behavioral patterns which include, but are not limited to, breeding, feeding, or sheltering." NMFS defines "harm" as "an act which actually kills or injures fish or wildlife." Such an act may include significant habitat modification or degradation where it actually kills or injures fish or wildlife by significantly impairing essential behavioral patterns, including breeding, spawning, rearing, migrating, feeding or sheltering. Take of species listed as endangered is prohibited at the time of listing, while take of threatened species may not be specifically prohibited unless NMFS has issued regulations prohibiting take under section 4(d) of the ESA.

valid for the re-initiation consultation that considers the listed species in Table 1. For this re-initiation consultation, the USFWS has identified the following stressor from the proposed action on the giant manta ray and the oceanic whitetip shark:

- Risk of a vessel strike.

To minimize the likelihood of interactions with listed species, the applicant would continue to abide by the previously offered Best Management Practice (BMP) of limiting the speed of the vessels used to transport construction material to Midway Atoll to 10 knots

Potential for vessel strikes
The proposed action would expose the listed species in Table 1 to the risk of being struck by a vessel transporting construction materials to Midway Atoll. Even with the high vessel traffic around Oahu, Hawaii, research has shown that that collisions between vessels and other listed species are relatively rare events. For instance, NMFS conservatively estimated that there are 37 .5 sea turtle and 0.45 Hawaiian monk seal vessel strikes per year from an estimated 577,872 vessel trips per year in Hawaii. This includes fishing and non-fishing vessels (NMFS 2008). This calculates to a 0.006% and .0000008% probability of a vessel strike with sea turtles and Hawaiian monk seals respectively for all vessels and trips, many of who are not reducing speeds or employing lookouts for listed species.

While specific studies have not been conducted for oceanic whitetip sharks or giant manta rays for vessel avoidance, they are elasmobranchs and are highly mobile species. Studies on scalloped hammerhead sharks have shown that they have well-developed electrosensory systems and vision (Kajiura 2001) that presumably enables them to detect activity in the water at a distance and to quickly move away from slow-moving vessels. The lateral line in manta rays is poorly understood, however they also have a suite of other biological functions which are considered highly sophisticated sensory systems (Bleckmann and Hoffmann 1999; Deakos 2010). This suggests that they possess similar capabilities of detection and could avoid slow moving vessels as well. In addition, giant manta rays remain underwater the vast majority of the time, and therefore would be at very low risk of being struck by vessels which are moving on the surface of the water.

Based on adherence to the vessel speed BMP mentioned above, the expectation that the listed species in Table 1 are widely scattered throughout the waters between and within the Monument, and the penchant for the listed species to avoid areas where vessels are operating; the USFWS has determined that the risk of a vessel collision with a the listed species in Table 1 would be discountable.

In the original consultation, the following stressors from the proposed action were also identified as sources of adverse effects on listed species:

1. Temporary disturbance from human activities;
2. Injury from construction activities;
3. Exposure to debris or contaminants; and
4. Risk of entrapment.

Each of these stressors will be considered as they relate to the recently listed giant manta ray and oceanic whitetip shark.

Temporary disturbance from human activities
The human activity considered in the re-initiation of the Midway seawall programmatic is the transport of construction equipment and materials from Oahu, Hawaii to Midway Atoll in the Monument. That activity is considered under the stressor identified as potential for ship strikes. All other human activities

related to this action would take place within Midway Atoll lagoon. Since both giant manta rays and oceanic whitetip sharks are pelagic species, and have never been observed inside the atoll of Midway, there is no risk of temporary disturbance from human activities on those species since there is no spatial or temporal overlap.

Injury from construction activities
The construction activities associated with the seawall repairs would take place with the lagoon at Midway Atoll. Since both giant manta rays and oceanic whitetip sharks are pelagic species, and have never been observed inside the atoll of Midway, there is no risk of injury from construction activities on those species since there is no spatial or temporal overlap.

Exposure to debris or contaminants
All of the debris and contaminants associated with the seawall repairs would result from the construction activities and from the equipment needed to perform the action, and would take place inside the lagoon of Midway Atoll. Since both giant manta rays and oceanic whitetip sharks are pelagic species, and have never been observed inside the atoll of Midway, there is no risk of exposure to debris or contaminants on those species since there is no spatial or temporal overlap.

Risk of entrapment
The risk of entrapment associated with the seawall repairs would be a result of construction activities that would take place inside the lagoon at Midway Atoll. Since both giant manta rays and oceanic whitetip sharks are pelagic species, and have never been observed inside the atoll of Midway, there is no risk of entrapment on those species since there is no spatial or temporal overlap.

Conclusion
NMFS has considered the information submitted for the original consultation for the Midway seawall repairs, as it pertains to the re-initiation of the informal programmatic Section 7 consultation for the giant manta ray (*Manta birostris*) and the oceanic whitetip shark (*Carcharhinus longimanus*), which were not considered in the original consultation that was initiated on May 2, 2017. Based on this review, and the implementation of the vessel speed BMP described above; NMFS concurs with the USFWS determination that the as-needed transport of construction material for the Midway seawall repairs would be not likely to adversely affect the giant manta ray and the oceanic whitetip shark.

This re-initiation of the Midway seawall repair programmatic consultation covers just the species (giant manta ray and oceanic whitetip shark) that were not considered in the original consultation from May of 2017. The determination of not likely to adversely affect for those species covered under the original consultation remains the same, because the action remains the same and there are no new stressors.

This concludes the re-initiation of the ESA Section 7 informal programmatic consultation to address the recent listings noted above. As with the original consultation, re-initiation of this consultation must take place if any of the following occurs:1) a take occurs[2]; 2) new information reveals effects of the action that may affect listed species or designated critical habitat in a manner or to an extent not previously considered; 3) the identified action is subsequently modified in a manner causing effects to listed species or designated critical habitat not previously considered; or 4) a new species is listed or critical habitat designated that may be affected by the identified action.

If you have further questions please contact Richard Hall on my staff at (808) 725-5018. Thank you for working with NMFS to protect our nation's living marine resources.

[2] Take occurs to a threatened or endangered species for those species which NMFS has issued regulations prohibiting take under section 4(d) of the Endangered Species Act.

Sincerely,

Ann M. Garrett
Assistant Regional Administrator
Protected Resources Division

cc: Amanda Pollock, USWFWS

NMFS File No.: PIR-2016-9989
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Literature

Bleckman, H. and M. H. Hoffman. 1999. Special senses; pp. 300–328 *in* W. C. Hamlett (ed.), Sharks, Skates and Rays: The Biology of Elasmobranch Fishes. Johns Hopkins, Baltimore. Google Scholar

Deakos, M. 2010. Ecology and social behaviour of a resident manta ray (*Manta alfredi*) population off Maui, Hawaii. PhD Thesis. University of Hawaii at Manoa.

Kaijura, S. 2001. Head morphology and electrosensory pore distribution of chacharhinid and sphyrind sharks. Env. Biol. Fishes. 61, 125-133.

Midway Seawall Repairs. 2017. Endangered Species Act Section 7 informal programmatic consultation between the USFWS and NMFS for the as-needed repairs to the Henderson Airfield seawall on Midway Atoll.

NMFS. 2008. Biological Evaluation: Effects of continued operation of the non-longline pelagic fisheries of the western Pacific on ESA-listed sea turtles and marine mammals. NMFS PIR, Honolulu, Hawaii. 32 pp. July, 2008.